U.S. Fish & Wildlife Service

FY 05 Alpena FRO Accomplishment Summary

Cooperation with Native Americans

Conserving this Nation's fish and other aquatic resources cannot be successful without the partnership of Tribes; they manage or influence some of the most important aquatic habitats both on and off reservations. In addition, the Federal government and the Service have distinct and unique obligations toward Tribes based on trust responsibility, treaty provisions, and statutory mandates. The Fisheries Program plays an important role in providing help and support to Tribes as they exercise their sovereignty in the management of their fish and wildlife resources on more than 55 million acres of Federal Indian trust land and in treaty reserved areas. The Alpena Fishery Resources Office in Alpena, Michigan actively cooperates with Michigan Tribes regarding conservation of Great Lakes fisheries. The accomplishments listed below reflect some of the activities the Alpena FRO conducted in cooperation with Native Americans in Fiscal Year 2005.

Technical Fisheries Committee Finalizes Lake Whitefish Harvest


Photo – A. Woldt, USFWS

Submitted by Jerry McClain
Fishery Biologist

The Technical Fisheries Committee (TFC) met in Roscommon on December 1, 2004 to finalize lake whitefish harvest limits for 2005. Model generated harvest limits, based on the most current biological and harvest data, are produced annually by the TFC's Modeling Subcommittee (MSC) for management units where fisheries are shared between the five Chippewa-Ottawa Resource Authority (CORA) tribes and the State of Michigan in 1836 Treaty waters of Lakes Superior, Michigan and Huron. The Consent Decree requires the TFC to provide these final harvest limits to the Parties by December 1 each year. In management units where the whitefish fishery is reserved for the CORA tribes, harvest regulation guidelines (HRG) are established by the tribes according to terms of a Tribal Management Plan. Final HRGs will be provided to the Parties once CORA has established them. Alpena FRO Project Leader McClain (TFC Chair) and Treaty Fisheries Unit Leader Woldt (MSC co-Chair) attended the meeting. McClain mailed the final harvest limit recommendations to the Parties on December 10.

Interagency participation in the Modeling Sub-Committee and the Technical Fisheries Committee ensures cooperation and agreement for establishment of safe harvest limits for lake whitefish and lake trout. The effort is consistent with and supportive of the "Cooperation with Native Americans", "Partnerships and Accountability", "Aquatic Species Conservation and Management", and "Leadership in Science and Technology" priorities of the Fisheries Program Vision for the Future.

Lake Whitefish Age Determination

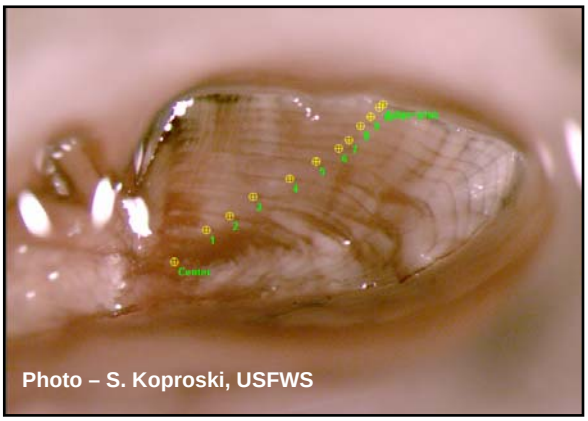


Photo – S. Koproski, USFWS

Submitted by Scott Koproski
Fishery Biologist

During the month of January 2005, Fishery Biologist Scott Koproski finished aging lake whitefish otoliths collected during the 2004 fishery independent lake whitefish survey. The Alpena FRO is responsible for assessing lake whitefish populations in two management units (WFH-04 and WFH-05) in northern Lake Huron. The study sampling design was established by the Modeling Subcommittee (MSC) of the Technical Fisheries Committee (TFC). The MSC is responsible for developing lake whitefish harvest limits in 1836 Treaty Ceded Waters. In 2004, the Alpena FRO collected 128 lake whitefish during assessment activities in Lake Huron lake whitefish management units WFH-04 and WFH-05. Scales and otoliths were collected from all lake whitefish sampled. Biologist Koproski used the "crack and burn" technique to identify annuli present in the otoliths. This technique allows researchers to differentiate two distinct growth patterns within the structure: broad summer growth and narrow winter growth. By counting the bands of winter growth, age estimates can be obtained from the otoliths. Ages, along with other biological parameters, are used in the statistical catch at age models used by the MSC to develop safe harvest limits in 1836 Treaty Waters.

The Alpena FRO is fulfilling the Service's obligations as a signatory to the 2000 Consent Decree by serving as members of the Technical Fisheries Committee and the Modeling Subcommittee, and by assessing lake whitefish populations in 1836 Treaty ceded waters. This work is an example of Alpena FRO's commitment to the Service's Fisheries Program Vision Priorities of "Cooperation with Native Americans" and "Aquatic Species Conservation and Management."

Experimental Gill Net Repairs

Submitted by Scott Koproski
Fishery Biologist

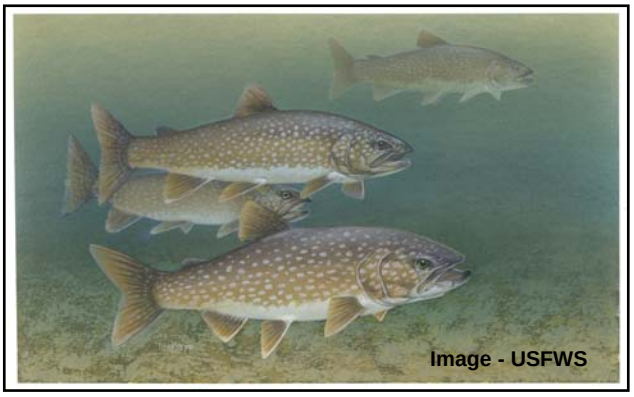
In February 2005, Fishery Biologists Scott Koproski and Adam Kowalski began repairing experimental assessment gill nets that were used during the 2004 fishery independent lake whitefish survey in 1836 Treaty waters. The experimental gill nets do not have lead weights secured to the net frame like standard bottom-set, gill nets. The experimental nets have a three

foot dropper line from the bottom of the net frame tied to a continuous piece of lead core line. The dropper lines are tied every 18" between the frame and the lead core line. This results in a "mesh free" area at the bottom 3 feet of the water column which helps reduce lake trout bycatch, since trout typically associate themselves with the lake bottom.

During the 2004 fishery independent lake whitefish surveys, both the standard and experimental assessment nets were fished simultaneously. Preliminary results indicate that lake whitefish CPE's increased slightly using the experimental assessment nets, and lake trout CPE's dropped significantly. Another gang of experimental assessment nets will be built prior to the 2005 fishery independent lake whitefish survey and fished to further compare catch rates in each net type.

The maintenance of gill nets and other equipment is work that is performed annually to ensure assessment activities are completed. This work is an example of Alpena FRO's commitment to the following Fisheries Vision Priorities: Partnerships and Accountability, Aquatic Species Conservation and Management, and Cooperation with Native Americans.

Service Biologist Co-Chairs Modeling Subcommittee Meeting for 1836 Treaty Waters



Submitted by Aaron Woldt
Fishery Biologist

Fishery Biologist Aaron Woldt of the Alpena FRO along with Shawn Sitar of Michigan DNR co-chaired the March 15-17, 2005 meeting of the Modeling Subcommittee (MSC) of the Technical Fisheries Committee (TFC). The primary focus of this meeting was to generate preliminary 2005 harvest limits for lake trout in 1836 Treaty waters of lakes Huron, Superior, and Michigan, although other technical matters were discussed. As stipulated in the 2000 Consent Decree, preliminary lake trout harvest numbers must be calculated by the MSC, reviewed by the TFC, and presented to the parties to the decree by March 31 each year. The 2000 Consent Decree is a 20 year fishery allocation agreement for 1836 Treaty waters signed by the State of Michigan, United States, Bay Mills Indian Community, Sault Ste. Marie Tribe of Chippewa Indians, Grand Traverse Band of Ottawa and Chippewa Indians, Little River Band of Ottawa Indians, and Little Traverse Bay Bands of Odawa Indians. The MSC will complete final lake trout harvest numbers and present them to the parties by April 30th as stipulated in the Decree.

Biologist Woldt and Ji He of the Michigan DNR presented an update of the status of northern Lake Huron (MH-1 and MH-2) lake trout stock assessment models, model diagnostic output, and preliminary 2005 lake trout harvest limits. 2005 Lake Huron preliminary lake trout harvest limits increased slightly from 2004 levels due to continued lower than target total mortality rates and increases in stock biomass due to decreasing mortality. In 2005, the Lake Huron models were

updated to include time varying weight at age and time varying maturity at age to capture recent shifts in weight at age and maturity at age in Lake Huron lake trout populations. These preliminary limits were presented to the TFC for review on April 6.

In addition to performing model analyses, biologist Woldt helped run the MSC meeting ensuring all agenda items were discussed and kept meeting minutes. A preliminary draft of the March 15-17 MSC meeting minutes was emailed to MSC members for review.

Harvest limits produced at this meeting, when reviewed by the parties and finalized, will become binding 2005 lake trout harvest limits for 1836 Treaty waters. These harvest limits will allow lake trout fisheries to be executed while still protecting the biological integrity of the lake trout stocks. This outcome is consistent with the Service's goal of building and maintaining self-sustaining populations of native fish species while meeting the needs of tribal communities under the "Aquatic Species Conservation and Management" and "Cooperation with Native Americans" priorities of the Fisheries Program Vision for the Future.

Technical Fisheries Committee Submits Recommended Lake Trout Harvest Limit for 2005

Submitted by Jerry McClain
Fishery Biologist

The Technical Fisheries Committee (TFC) met twice during the month of April to produce lake trout harvest limits for 2005 tribal commercial and state recreational fisheries in 1836 Treaty waters of lakes Superior, Michigan and Huron. On April 6, 2005 the TFC met to review preliminary harvest limits produced by the Modeling Subcommittee (MSC) and discuss lake trout population trends in the respective lake trout management units, then on April 27 approved the final harvest limits for the upcoming season. Using the most current and statistically valid assessment and harvest data available, the MSC uses Statistical Catch at Age Modeling (SCAA) to produce recommended safe harvest limits for the upcoming fishing season. Alpena FRO project leader McClain (TFC Chair) and Treaty Fisheries Unit leader Woldt (MSC co-Chair) attended the meetings. McClain mailed the final harvest limit recommendations to the Parties on May 11.

Interagency participation in the Modeling Sub-Committee and the Technical Fisheries Committee ensures cooperation and agreement for establishment of safe harvest limits for lake trout. The effort is consistent with and supportive of the Partnerships and Accountability, Aquatic Species Conservation and Management, Cooperation with Native Americans, and Leadership in Science and Technology priorities of the Fisheries Program Vision for the Future.

Alpena FRO Provides Assistance to Huron Potawatomi Tribe for Wildlife Management Planning

Submitted by Jerry McClain
Fishery Biologist

On May 3, 2005, Project Leader McClain was contacted by Ben Skarp, Biologist with the Huron Potawatomi Tribe in southwest Michigan, seeking assistance in development of a wildlife management plan for the tribe. Mr. Skarp has received funding through the Service's Tribal Wildlife Grant program to develop a tribal wildlife and habitat management plan for the tribe. McClain provided verbal guidance and electronic links to existing fish and wildlife management plans that will help Skarp develop his planning documents. Alpena FRO is Region 3's lead field station for technical assistance to the Huron Potawatomi Tribe and Mr. Skarp was provided Project Leader McClain's name by John Leonard, Region 3's Native American Coordinator.

Providing technical assistance to tribal governments helps fulfill the Service's federal Native American trust responsibilities and is consistent with the "Cooperation with Native Americans" priority of the Service's Fisheries Program Vision for the Future.

Alpena FRO Conducts 2005 Fishery Independent Lake Whitefish Survey in Northern Lake Huron


Photo – A. Woldt, USFWS

Submitted by Aaron Woldt
Fishery Biologist

From July 11 to August 30, 2005 staff from the Alpena Fisheries Resource Office (FRO) conducted a fishery independent lake whitefish survey in 1836 Treaty waters of northern Lake Huron. Staff involved included Treaty Unit Coordinator Aaron Woldt, Fishery Biologists Adam Kowalski, Scott Koproski, Susan Wells, Anjie Bowen, and James Boase, and Project Leader Jerry McClain. The goal of this survey was to collect fishery independent abundance and biological data of lake whitefish stocks in treaty waters for use in statistical-catch-at-age (SCAA) population models that are updated annually to determine harvest regulation guidelines (HRG's) for tribal commercial fishers in 1836 Treaty waters.

As dictated in the 2000 Consent Decree—a 20 year fishery allocation agreement for 1836 Treaty waters signed by the State of Michigan, United States, Bay Mills Indian Community, Sault Ste. Marie Tribe of Chippewa Indians, Grand Traverse Band of Ottawa and Chippewa Indians, Little River Band of Ottawa Indians, and Little Traverse Bay Bands of Odawa Indians—the Modeling Subcommittee (MSC) of the Technical Fisheries Committee (TFC) annually collects data and conducts model runs to determine lake whitefish HRG's for 5 management units in northern

Lake Huron. In 2002, the MSC identified fishery independent lake whitefish data as a critical information need. This survey meets the data need identified by the MSC.

Using the Alpena FRO 30' research vessel and staff, 24 overnight, variable mesh gill net sets were conducted at randomly selected sites in lake whitefish management unit 4 (Alpena to Presque Isle) and lake whitefish management unit 5 (Presque Isle to Hammond Bay). Twelve overnight, variable mesh gill net sets legged 3' off the bottom were also conducted. The Alpena FRO is evaluating whether these legged nets increase lake whitefish catch and decrease lake trout bycatch. All lake whitefish collected were measured for length, weighed, checked for lamprey wounds, sexed, and assessed for maturity and visceral fat content. Non-target fish species were worked up in a similar manner as well. We took scale and otolith samples from each lake whitefish for age determination and removed stomachs whole.

Preliminary analyses show that lake whitefish catch rates were similar between bottom-set and legged nets; however, lake trout catch rates were significantly lower in legged nets than in bottom sets. Similar to 2004, 2005 lake trout catch rates were lower than in 2002 and 2003 when this survey was executed from mid-May to mid-June. This survey will continue annually and be tailored to meet needs identified by the MSC. All data from this survey will be compiled, maintained, and analyzed at the Alpena FRO.

Data collected in this survey will improve the accuracy of population models used to set lake whitefish harvest guidelines in 1836 Treaty waters of northern Lake Huron. Harvest limits allow fisheries to be executed while still protecting the biological integrity of the stocks. This outcome is consistent with the Service's goal of maintaining self-sustaining populations of native fish species while meeting the needs of tribal communities under the "Aquatic Species Conservation and Management" and "Cooperation with Native Americans" priorities of the Fishery Program's Vision for the Future.

Alpena FRO Assists Chippewa Ottawa Resource Authority with Walleye Assessments in 1836 Treaty Waters

Submitted by Scott Koproski
Fishery Biologist

During the week of September 19, 2005, Fishery Biologist Scott Koproski traveled to Sault Ste. Marie, MI to assist the Chippewa Ottawa Resource Authority (CORA) with their annual juvenile walleye assessment of the St. Marys River. Using the Alpena FRO's electrofishing vessel, Koproski and 2 CORA staff sampled 4 locations in the St Marys River system (Waiska Bay, Lake Nicolet, Lake George, Sugar Island Side Channel) over 4 nights. The objective of this work is to determine the percent contribution of hatchery reared walleye to the St. Marys River walleye population and to index juvenile walleye abundance. Hatchery stocked walleye are immersed in oxytetracycline (OTC) prior to release. OTC leaves a mark on calcified structures like otoliths and vertebrae that can be detected in the lab. Data collected will also be used to determine appropriate stocking levels and stocking locations for this system. Staff from the Alpena FRO has been assisting CORA with this walleye assessment for the past 13 years.

Assessment of walleye in the St. Marys River is another example of the Alpena FRO's commitment to the following Fisheries Vision Priorities: Aquatic Species Conservation and Management and Cooperation with Native Americans. Walleye are both a recreationally and commercially important species in 1836 Treaty waters. The Alpena FRO will continue to evaluate stocking success by CORA in the future which will benefit the resource and all harvesting parties.

Service Biologist Chairs Modeling Subcommittee Meeting for 1836 Treaty Waters

Submitted by Aaron Woldt
Fishery Biologist

Fishery Biologist Aaron Woldt of the Alpena FRO attended and chaired the September 22-23, 2005 meeting of the Modeling Subcommittee (MSC) of the Technical Fisheries Committee (TFC). The primary focus of this meeting was to generate preliminary 2006 harvest limits for lake whitefish management units in 1836 Treaty waters of lakes Huron, Superior, and Michigan, although other technical matters were discussed. As stipulated in the 2000 Consent Decree, preliminary lake whitefish harvest limits must be calculated by the MSC, reviewed by the TFC, and presented to the parties to the decree by November 1 each year.

In addition to performing lake whitefish model analyses, biologist Woldt ran the MSC meeting ensuring all agenda items were discussed and kept meeting minutes. A preliminary draft of the September 22-23 MSC meeting minutes was mailed to MSC members for review.

Preliminary lake whitefish harvest limits were presented to the TFC for review on October 4. The MSC will complete final lake whitefish harvest limits and present them to the TFC at its December 2 meeting.

Harvest limits produced at this meeting, when reviewed by the parties and approved, will become binding 2006 lake whitefish harvest limits for 1836 Treaty waters. These harvest limits will allow lake whitefish fisheries to be executed while still protecting the biological integrity of the lake whitefish stocks. This outcome is consistent with the Service's goal of building and maintaining self-sustaining populations of native fish species while meeting the needs of tribal communities under the "Aquatic Species Conservation and Management" and "Cooperation with Native Americans" priorities of the Fisheries Program Vision for the Future.

The **Alpena Fishery Resources Office (FRO)** is located in Alpena, Michigan and works to meet U.S. Fish and Wildlife Service Fishery and Ecosystem goals within Lake Huron, Western Lake Erie, and connecting waters of the St. Marys River, St. Clair River, and Detroit River. Activities include Aquatic Species Conservation and Management, Aquatic Habitat Conservation and Management, Cooperation with Native Americans, Leadership in Science and Technology, Partnerships and Accountability, Public Use, and Workforce Management – all of which are conducted in alignment with the Service Fisheries Program Vision for the Future. The station is one of many field offices located within Region 3, the Great Lakes Big Rivers Region.

Alpena FRO Accomplishment Report
FY 2005

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For more information on Alpena FRO programs and activities or to view other station reports visit our website located at http://www.fws.gov/midwest/alpena/.